INTERNATIONAL SEARCH REPORT

tional Application No

PCT/IB2004/050330 A. CLASSIFICATION OF SUBJECT MATTER
IPC 7 H03F1/34 H03F1/14 H03F1/08 H03F3/45 H03F1/32 H03F3/60 According to International Patent Classification (IPC) or to both national classification and IPC **B. FIELDS SEARCHED** Minimum documentation searched (classification system followed by classification symbols) IPC 7 H03F Documentation searched other than minimum documentation to the extent that such documents are included in the fields searched Electronic data base consulted during the international search (name of data base and, where practical, search terms used) EPO-Internal C. DOCUMENTS CONSIDERED TO BE RELEVANT Relevant to claim No. Citation of document, with indication, where appropriate, of the relevant passages Category ° Y US 6 211 738 B1 (HECHT JAMES BURR) 1 - 193 April 2001 (2001-04-03) cited in the application column 4, line 44 - column 5, line 23; figure 3 Y EP 1 202 446 A (MATSUSHITA ELECTRIC IND CO 1-19 LTD) 2 May 2002 (2002-05-02) column 4, line 11 - column 6, line 56; figures 1,2 Α US 6 172 563 B1 (TRASK CHRISTOPHER) 1 - 199 January 2001 (2001-01-09) column 6, line 44 - column 7, line 42; figure 6 -/--

Further documents are listed in the continuation of box C.	Patent family members are listed in annex.
Special categories of cited documents: A' document defining the general state of the art which is not considered to be of particular relevance E' earlier document but published on or after the international filing date L' document which may throw doubts on priority claim(s) or which is cited to establish the publication date of another citation or other special reason (as specified) O' document referring to an oral disclosure, use, exhibition or other means P' document published prior to the international filing date but later than the priority date claimed	 "T" later document published after the International filing date or priority date and not in conflict with the application but cited to understand the principle or theory underlying the invention "X" document of particular relevance; the claimed invention cannot be considered novel or cannot be considered to involve an inventive step when the document is taken alone "Y" document of particular relevance; the claimed invention cannot be considered to involve an inventive step when the document is combined with one or more other such documents, such combination being obvious to a person skilled in the art. "&" document member of the same patent family
Date of the actual completion of the international search 14 June 2004	Date of mailing of the international search report 24/06/2004
Name and mailing address of the ISA European Patent Office, P.B. 5818 Patentlaan 2 NL – 2280 HV Rijswijk Tel. (+31-70) 340-2040, Tx. 31 651 epo ni, Fax: (+31-70) 340-3016	Authorized officer Fedi, G

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Interional Application No PCT/IB2004/050330

		PC1/182004/050330		
C.(Continua Category °	ation) DOCUMENTS CONSIDERED TO BE RELEVANT Citation of document, with indication, where appropriate, of the relevant passages	Relevant to claim No.		
Dategory				
A .	US 2002/135427 A1 (YOKOTA YASUHIRO) 26 September 2002 (2002-09-26) page 2, left-hand column, lines 9-32; figures 12,13	1-19		

INTERNATIONAL SEARCH REPORT

iformation on patent family members

Interional Application No PCT/IB2004/050330

Patent document cited in search report		Publication date		Patent family member(s)		Publication date
US 6211738	B1	03-04-2001	US	2001019290	A1	06-09-2001
EP 1202446	A	02-05-2002	EP JP US	1202446 2002204131 2002067211	Α	02-05-2002 19-07-2002 06-06-2002
US 6172563	B1	09-01-2001	NONE			
US 2002135427	A1	26-09-2002	WO	0126217	A1	12-04-2001